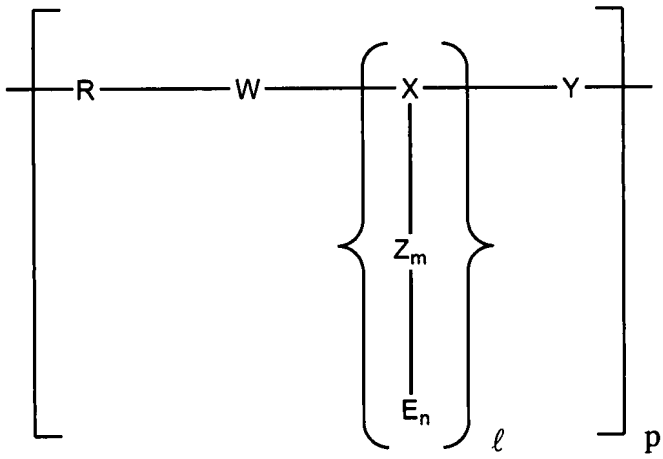
AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application. With the amendments, claims remain pending.

Listing of Claims:

1. (Previously presented) A combination of a carrier and a complex, wherein said complex comprises a nucleic acid molecule and a charged copolymer, wherein said charged copolymer is bound in the complex via ionic interactions and has the general formula I:

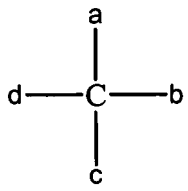


wherein R is an amphiphilic polymer or a homo- or hetero-bifunctional derivative thereof,

and

i) wherein X is an amino acid or an amino acid derivative, a peptide or a peptide derivative or a spermine or a spermidine derivative; or

ii) wherein X is

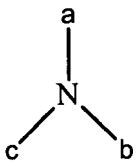


wherein

a is H or, optionally halogen- or dialkylamino-substituted, C_1-C_6 alkyl; and wherein

b, c and d are the same or different, optionally halogen- or dialkylamino-substituted, C_1-C_6 alkylene; or

iii) wherein X is



wherein

a, b and c are the same or different, optionally halogen- or dialkylamino-substituted, C_1-C_6 alkylene; or

iv) wherein X

is a substituted aromatic compound with three functional groupings W_1, Y_1, Z_1;

wherein

W, Y or Z and W_1, Y_1, Z_1 are the same or different and are selected from CO, NH, O or S or a linker grouping capable of reacting with SH, OH, NH or NH_2;

and wherein the effector molecule E

is a cationic or anionic peptide or peptide derivative or a spermine or spermidine derivative or a glycosaminoglycan or a non-peptidic oligo/polycation or -anion; wherein

m and n are independently of each other 0, 1 or 2; wherein

p preferably is 3 to 20; and wherein

ℓ is 1 to 5.

2. (Previously presented) The combination according to claim 1, wherein the amphiphilic polymer is a polyalkylene oxide.

3. (Previously presented) The combination according to claim 2, wherein the amphiphilic polymer is a polyalkylene glycol.

4. (Previously presented) The combination according to any one of claims 1-3, wherein X or E is a charged peptide or peptide derivative.

5. (Previously presented) The combination according to claim 1, wherein a ligand for a higher eukaryotic cell is coupled to the copolymer.

6. (Previously presented) The combination according to any one of claims 1-3 and 5, wherein the nucleic acid molecule is condensed with an organic polycation or cationic

lipid molecule and the complex formed thereby has a charged copolymer of the general formula I bound to its surface via ionic interaction.

7. (Previously presented) The combination according to any one of claims 1-3 and 5, containing a therapeutically effective nucleic acid molecule.

8. (Previously presented) The combination according to any one of claims 1-3 and 5, wherein the carrier consists of a biologically non-resorbable material.

9. (Previously presented) The combination according to any one of claims 1-3 and 5, wherein the carrier consists of a biologically resorbable material.

10. (Original) The combination according to claim 9, wherein the biologically resorbable material is collagen.

11. (Original) The combination according to claim 10, wherein the carrier is a collagen sponge.

12. (Canceled)

13. (Previously presented) A method of transferring a nucleic acid molecule into a cell comprising using the combination according to any one of claims 1-3 and 5.

14. (Previously presented) A pharmaceutical composition comprising the combination according to any one of claims 1-3 and 5.

15. (Canceled)

16. (Previously presented) A kit comprising a carrier and a copolymer or a complex as defined in claim 1.

17. (Previously presented) The combination according to claim 1, wherein ℓ is 1.

18. (Previously presented) The combination according to claim 9, wherein the biologically resorbable material is selected from the group consisting of chitin, oxycellulose, gelatine, polyethylene glycol carbonates, aliphatic polyesters, and fibrin glues produced from thrombin or fibrinogen.

19. (Previously presented) The combination according to claim 8, wherein the biologically non-resorbable material is a metal material.

20. (Previously presented) The combination according to claim 19, wherein the metal material is titanium.

21. (Previously presented) The combination according to claim 9, wherein the biologically resorbable material is an aliphatic polyester.

22. (Previously presented) The combination according to claim 9, wherein the biologically resorbable material is a polylactic acid.

23. (Previously presented) The combination of claim 1 wherein the carrier is an implant.

24. (Previously presented) The combination of claim 1 wherein the carrier is an endoprosthesis.